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10/697,405	10/29/2003	Alexander Clemm	50325-0816	7264
29989      7590      07/01/2008 HICKMAN PALERMO TRUONG & BECKER, LLP 2055 GATEWAY PLACE SUITE 550 SAN JOSE, CA 95110				
EXAMINER				
FRINK, JOHN MOORE				
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/697,405

**Applicant(s)**

CLEMM ET AL.

**Examiner**

JOHN M. FRINK

**Art Unit**

2142

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 01 April 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-16, 18-37, 39-58, 60-79 and 81-84 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-16, 18-37, 39-58, 60-79, 81-84 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's arguments, see pgs. 19 and 20, filed 4/01/2008, with respect to 35 USC 101 rejections made regarding claims 1-16, 18-37, 39- 42, 64-79 and 81-84 have been fully considered and are persuasive. The rejection under 35 USC 101 of said claims has thus been withdrawn.
2. Specifically, regarding claims 22-37, 39-42, 64-79 and 81-84, Applicant states that the claimed medium "excludes acoustic and light waves" and thus does not cover non-statutory subject matter. Said argument is persuasive.
3. Applicant's arguments regarding claims 43-58 and 60-63 on page 20 have been considered but are not persuasive. Applicant argues that "the possibility that one embodiment among the combination might consist only of software, does not imply that the claim as a whole is directed to non-statutory subject matter." However, though some embodiments of the claims may be statutory, the specification and claim language show the claim language is indeed directed to non-statutory embodiments as well, and thus the rejection for being directed to non-statutory subject matter is maintained.
4. Applicant next argues the rejections of claims 7-9, 28-30, 49-51 and 70-72 under 35 USC 112, rejected for failing to comply with the written description requirement. Applicant argues that the amendments previously made to said claims are supported by paragraph 32 of the pending applications specification, specifically "In other embodiments not depicted in Figs. 1A-1C, other entities within a particular site may detect events associated with devices occurring within the particular site." However, the

Examiner does not agree that paragraph 36 or the emphasized text, quoted above, supports the limitations added to said claims in Applicant's amendment (filed 10/24/2007). Claims 7-9, 28-30, 49-51 and 70-72 were amended to recite a where the alarm identification component is "first alarm identification component and a second alarm identification component" (see claim 7, with the other claims reciting similar limitations). The Specification, including cited paragraph 36, as well as the figures contained within, do not support the details of this limitation. Applicant's arguments thus are not persuasive.

5. Applicant next argues that claims 1, 22, 43 and 64, as amended, are not taught by Levi. Applicant's arguments are persuasive, but after further consideration, new grounds of rejection have been made which are discussed in further detail below.

6. Regarding claims 17, 38, 59 and 80, rejected under 35 USC 103, Levi in view of Lecheler, Natarajan, and Goudreau, Applicant argues that 'Goudreau teaches away from its combination with the other references'.

7. To support this assertion, Applicant then argues that "The 'lookup table' of Goudreau is used by an edge router only to forward packets, a teaching having nothing whatsoever to do with communicating an alarm in a computer network". Applicant's argument is not persuasive, as forwarding packets does relate to communicating alarms in computer networks, as traffic in computer networks, including alarms, can be communicated/propagated by forwarding packets. Furthermore, Goudreau was not cited to teach communicating alarms.

8. Applicant next argues that "the teaching of Goudreau would lead the artisan to drop the use of: (1) network device address information and (2) edge router information, and use the mapping table alone, because of the benefits "including speed, simplicity, and modularity", citing paragraph 9 of Goudreau as support. Paragraph 9 of Goudreau does indeed describe the benefits of utilizing a mapping table, but also lists its disadvantages, which include "no provision for QOS". Goudreau then continues in paragraphs 41 - 42 to discuss utilizing an improvement over the mapping table of paragraph 9, which Goudreau describes as a lookup table with "source identification codes and the service code" and supporting "service classes".

9. Goudreau also describes in paragraph 16 that "Typically, classification is assumed to occur at the "edge router". However, to improve on this type of classification, which results in "bottlenecks" in moderate to large networks, the above discussed lookup table of paragraphs 41 - 42 is subsequently disclosed. Thus, Goudreau does teach what was cited; utilizing a mapping table (said 'lookup table' of paragraphs 41 - 42) in preference to utilizing traditional edge router classification. However, the traditional edge router approach discussed in paragraph 16 remains an option, as Goudreau does not see any disadvantages in this approach for small networks. Applicant's argument thus is not persuasive.

10. Applicant next argues that "Goudreau provides no guidance regarding what is to happen if an incoming packet cannot be matched to 'corresponding code' in the 'QoS Table'. However, Goudreau was not cited to teach this subject matter, and thus Applicant's argument is not persuasive.

***Specification***

11. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter for the reasons given below in the 35 USC 112 written description rejections. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o).

***Claim Rejections - 35 USC § 112***

12. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

13. Claims 22 – 37, 39 – 42 and 64 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Said claims refer to “computer-readable storage medium” which is not described in Applicant’s specification.

14. Claims 7, 8, 9, 28, 29, 30, 49, 50, 51, 70, 71 and 72 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Specifically, all of claims 7, 8, 9, 28, 29, 30, 49, 50, 51, 70, 71 and 72, as amended, now discuss where both a first and a second alarm identification component are utilized where one alarm identification component, as outlined in claim 1, is in the

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device generating said alarm, and the other alarm identification component, described in the claims 7, 8, 9, 28, 29, 30, 49, 50, 51, 70, 71 and 72, is in a different device. Figs. 1A and 1B illustrates and discloses these two ideas for placement of said alarm identification components, but there is no support in the specification for utilizing both alarm identification components together.

***Claim Rejections - 35 USC § 101***

15. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

16. Claims 43-58 and 60-63 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Said claims are addressed to a means including a network device, an alarm identification component and a network operations center. However, said network device is specified in [26] as being potentially embodied only in software, as are said alarm identification component in [22] and said operations center in [21].

***Claim Rejections - 35 USC § 103***

17. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

18. Claims 1 – 9, 11 – 16, 18, 20 – 30, 32 – 37, 39, 41 – 51, 53 – 58, 60, 62 – 72, 74 – 81, 83 and 84 are rejected under 35 U.S.C. 103(a) as being unpatentable over Levi

(US 6,636,983 B1) in view of Lecheler et al. (US 6,425,008 B1), hereafter Lecheler, further in view of Natarajan et al. (US 2002/0156882 A1), hereafter Natarajan, and Goudreau (US 2004/0213224 A1).

19. Regarding claims 1, 21, 43 and 64 Levi shows a method for communicating an alarm in a computer network comprising a, as well as a computer-readable medium (col. 2 lines 32 - 45), along with means for (col. 2 lines 6 - 23, col. 21 lines 3 - 7, col. 29 lines 28 - 44) a network device (Fig. 6, item 30) detecting an event within the network device on the computer network, wherein the network device is included in a particular site in a plurality of sites and wherein the event results from a change in operation of the network device (col. 3 line 45 - col. 4 line 4, col. 4 lines 25 - 34, col. 5 line 49 - col. 5 line 17)

in response to detecting the event, the network device generating and propagating an alarm to the alarm identification component that is hosted within the network device (col. 4 line 49 - col. 5 line 17, where the event is propagated by, in one embodiment, writing to a log (col. 5 lines 13 - 15) or relaying an event (col. 4 line 56-58))

the alarm identification component (Fig. 6 item 81) augmenting the alarm with identification information to create an augmented alarm, wherein the identification information uniquely identifies the particular site among the plurality of sites (col. 15 lines 43 - 44, col. 8 lines 56-65, col. 17 lines 27 - 32) and

transmitting the augmented alarm to a network operations center for the computer network, wherein the network operations center is external to the particular



site and the network operations center processes alarms for each site in the plurality of sites (col. 15 lines 48-67).

Levi does not show wherein augmenting the alarm further comprises determining whether the identification information can be created based on a table that maps network device addresses to identification information, when the identification information can not be created based on the table, determining whether the identification information can be created based on an address of an edge router for the particular site, and when the identification information can not be created based on an address of the edge router for a particular site, creating the identification information using default identification information.

Lecheler shows where the identification information may be created based on a table that maps device addresses to identification information (Fig. 3 item 84).

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the disclosure of Levi with that of Lecheler in order to reduce the time necessary to respond to an error and reduce the time necessary to correct the error (Lecheler col. 6 lines 22 – 26).

Levi in view of Lechler do not show when the identification information can not be created based on the table, determining whether the identification information can be created based on an address of an edge router for the particular site, and when the identification information can not be created based on an address of the edge router for a particular site, creating the identification information using default identification information.

Natarajan show creating identification information based on the address of an edge router for the particular site ([26, 29]) and creating the identification information using a default identification information (Natarajan [0021-0023], where in this embodiment a default set of information is used, one embodiment being utilizing the customer name as the default identifier for all alarm components utilized in that customer's site).

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the disclosure of Levi in view of Lecheler with that of Natarajan in order to enable additional methods for creating identification information, as more options leads to a more robust system. Further, by having identification information that can always be retrieved/utilized (the default case) further stability is inherently added to the system.

Levi in view of Lecheler and Natarajan do not show prioritizing the use of said mapping table over said edge router information.

Goudreau shows prioritizing the use of said mapping table over said edge router information, specifically showing where said mapping table is the fastest, most simple method [0009], and providing utilizing edge routers as a more advanced alternative [0003-0007, 0016].

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the disclosure of Levi in view of Lecheler and Natarajan and with that of Goudreau in order to provide for more advanced traffic management designed to

accommodate present and future internet traffic that considers multiple methods of managing said traffic in order to utilize the optimum choice (Goudreau, [0002-0009]).

20. Regarding claims 2, 23, 44 and 65, Levi in view of Lecheler, Natarajan and Goudreau further show where the identification information comprises a first portion and a second portion, wherein the first portion uniquely identifies the particular site among the plurality of sites, and the second portion includes the MAC address of the network device (Levi; col. 17 lines 27 – 32 showing the device ID + the MAC address, where devices are associated and linked to sites and thus the device ID identifies the device along with the site. Additionally, col. 22 lines 20 – 35 shows utilizing the device network address (representing applicants claimed 'site')).

21. Regarding claims 3, 24, 45 and 66, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the identification information comprises a first portion and a second portion, wherein the first portion uniquely identifies the particular site among the plurality of sites and the second portion uniquely identifies the network device on the computer network (Levi; col. 17 lines 27 - 32 and col. 22 lines 20 – 35, where said MAC address is inherently unique).

22. Regarding claims 4, 25, 46 and 67, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the identification information comprises a first portion and a second portion, wherein the first portion uniquely identifies the particular site among the plurality of sites and the second portion includes an IP address for the network device on the computer network (Levi; col. 22 lines 23 -35).

23. Regarding claims 5, 26, 47 and 68, Levi in view of Lecheler, Natarajan and Goudreau further shows wherein the identification information comprises a first portion and a second portion wherein the first portion uniquely identifies the particular site among the plurality of sites and the second portion includes geographical information associated with the particular site in which the alarm originated (Levi; col. 22 lines 23 - 35, showing using a zip code and GPS information).

24. Regarding claims 6, 27, 48 and 69, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the identification information comprises a first portion and a second portion where the first portion uniquely identifies the particular site among the plurality of sites and the second portion includes network information associated with the particular site in which the alarm originated (Levi; col. 22 lines 23 – 35, where the network IP address represents said 'network information').

25. Regarding claims 7, 28, 49 and 70 Levi in view of Lecheler, Natarajan and Goudreau further show wherein the alarm identification component is a first alarm identification component and a second alarm identification component (Natarajan; Fig. 1 and [12, 19, 20 and 30]) is hosted by an edge router associated with the particular site (Goudreau; [6, 16, 44, 59]).

26. Regarding claims 8, 29, 50 and 71 Levi in view of Lecheler, Natarajan and Goudreau further show wherein the alarm identification component is a first alarm identification component, each site in the plurality of sites is a local area network, a second alarm identification component is hosted by a router (Natarajan [30]) that communicates with one or more edge routers and wherein each one of the one or more

edge routers is associated with a different site in the plurality of sites (Goudreau [6, 16, 44, 59]).

27. Regarding claims 9, 30, 51 and 72, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the alarm identification component is a first alarm identification component, the network device is a first network device (Levi; col. 4 line 49 - col. 5 line 17) and a second alarm identification component is hosted by a second network device that is included in the particular site (Levi; Fig. 1, showing multiple devices per site that are monitored, where each monitored device contains an alarm identification component).

28. Regarding claims 11, 32, 53 and 74, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the step of detecting the event comprises detecting a condition using a SNMP agent that is in the network device (Levi; Fig. 6A, col. 17 lines 1 - 37).

29. Regarding claims 12, 33, 54 and 75, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the step of propagating the alarm to the alarm identification component is performed by transmission of a SNMP message, a Syslog event, or a CNS bus event (Levi; col. 17 lines 1 - 37).

30. Regarding claims 13, 34, 55 and 76, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the network device is selected from the group consisting of a switch, a router, an IP phone, a call manager component, a voice mail component, and an event monitoring component (Levi; Fig. 12, item 630 and col. 29 lines 27-42).

31. Regarding claims 14, 35, 56 and 77, Levi in view of Lecheler, Natarajan and Goudreau further show creating the identification information based on an address of the network device on the computer network (Levi; col. 8 lines 57 – 64).

32. Regarding claims 15, 36, 57 and 78, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the alarm identification component is a first alarm identification component (Levi, Fig. 6), each site in the plurality of sites is a local area network and wherein a second alarm identification component is hosted by a router (Natarajan [30]) that communicates with one or more edge routers and wherein each of the one or more edge routers is associated with a different site in the plurality of sites (Goudreau [6, 16, 44, 59]).

33. Regarding claims 16, 37, 58 and 79, Levi in view of Lecheler, Natarajan and Goudreau further show creating the identification information based on a table that maps device addresses to identification information (Lecheler; Fig. 3 item 84).

34. Regarding claims 18, 39, 60 and 81, Levi in view of Lecheler, Natarajan and Goudreau further show where the identification information is the same for each alarm originating in the particular site (Natarajan [21] lines 10-12).

35. Regarding claims 20, 41, 62 and 83, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the network device is a first network device, wherein a second network device is included in a different site in the plurality of sites than the particular site that includes the first device (Levi, Fig. 1, showing multiple sites and multiple monitored device per site), wherein the first device and second device are associated with an IP address that is the same for both the first device and the second

device, and wherein the identification information allows the network operations center to determine that the augmented alarm is for the first network

36. Regarding claims 21, 42, 63 and 84, Levi in view of Lecheler, Natarajan and Goudreau further show wherein the augmented alarm is included in a plurality of augmented alarms received at the network operations center, wherein the plurality of augmented alarms includes one or more augmented alarms from each site of the plurality of sites (Levi, col. 3 line 45 – col. 5 line 35) wherein said each one or more augmented alarms is based on identification information that uniquely identifies said each site among the plurality of sites (Levi, col. 8 lines 55 - 65, col. 17 lines 27-32, col. 15 lines 43-44) wherein the network operations center creates a view comprising a subset of the plurality of augmented alarms corresponding to the particular site by filtering the plurality of augmented alarms corresponding to the particular site by filtering the plurality of augmented alarms based on the identification information that uniquely identifies the particular site among the plurality of sites (Levi, Fig. 1 and col. 14 line 17 – col. 15 line 20).

37. Claims 10, 31, 52 and 73 are rejected under 35 U.S.C. 103(a) as being unpatentable over Levi in view of Lecheler, Natarajan and Goudreau as applied to claims 1, 22, 43 and 64 above, and further in view of Perkins (SNMP Alarms and MIB Module).

Levi in view of Lecheler, Natarajan and Goudreau show the alarm identification component augmenting the alarm, including using SNMP, but do not show wherein the step of the alarm identification component augmenting the alarm with identification

information comprises conveying the identification information in a VarBind portion of an SNMP message associated with the alarm.

Perkins shows herein the step of augmenting the alarm with identification information comprises conveying the identification information in a VarBind portion of a SNMP message associated with the alarm (Section 4).

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the disclosure of Levi in view of Lecheler, Natarajan and Goudreau with that of Perkins as Perkins' disclosure is concerned solely with SNMP Alarms and how they can best be utilized and leveraged (Perkins, title, Section 1), while Levi also enables using and anticipates the use of SNMP for the same purpose.

38. Claims 19, 40, 61 and 82 are rejected under 35 U.S.C. 103(a) as being unpatentable over Levi in view of Lecheler, Natarajan and Goudreau and further in view of Dacier et al. (US 2003/0110398), hereafter Dacier.

Levi in view of Lecheler, Natarajan and Goudreau shows claim 1, 22, 43 and 64.

Levi in view of Lecheler, Natarajan and Goudreau do not show where the particular site utilizes network address translation.

Dacier shows utilizing network address translation (Figs. 1, 2, 3, and 4, [0044], where Firewall 13 of Fig. 1 is a NAT).

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the disclosure of Levi in view of Lecheler, Natarajan and Goudreau with that of Dacier in order to support processing alarms on more advanced network configurations such as those shown in Dacier, that utilize standardized technology such



as NATs, allowing for alarm identification and investigation that yield a root cause for said alarm (Dacier, Abstract).

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to JOHN M. FRINK whose telephone number is (571) 272-9686. The examiner can normally be reached on M-F 7:30AM - 5:00PM EST; off alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Caldwell can be reached on (571) 272-3868. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Art Unit: 2142

John Frink

(571) 272 - 9686

/Andrew Caldwell/

Supervisory Patent Examiner, Art Unit 2142